Another Bubble Burst: Stock Options and the California AMT

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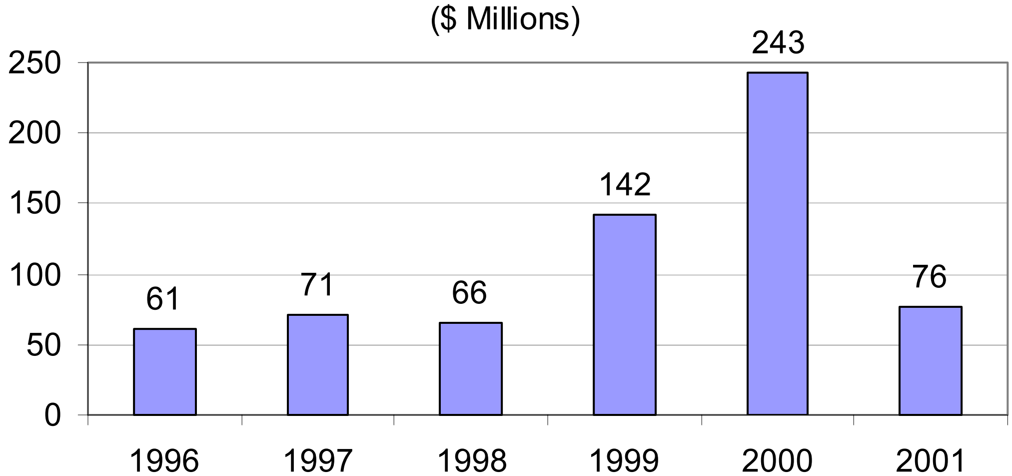
Abstract

Alternative Minimum Tax payments by California Personal Income Tax payers increased almost fourfold from 1998 to 2000. This increase was a short-term spike caused by an increase in stock options. We find that some taxpayers with stock options faced tax bills that were very large relative to their reported income; however, the number of taxpayers facing severe financial hardship from this phenomenon appears to be relatively small.

The original purpose of the Alternative Minimum Tax (AMT) was to prevent a small number of taxpayers with very high gross incomes from using tax preferences (exclusions, deductions, and credits) to avoid paying income taxes. As currently structured, however, the number of taxpayers owing federal AMT is projected to skyrocket. One recent estimate anticipates that 36 million taxpayers will be affected by AMT by 2010.[1] California has a state level AMT similar to the federal AMT. Beginning with the 1998 tax year, California attempted to forestall the projected rapid increase in the number of taxpayers subject to the AMT by indexing for inflation its AMT exemptions and exemption phase-out levels. Despite this reform, the number of taxpayers paying California AMT doubled from approximately 11,000 in 1998 to more than 22,000 in 2000, and the amount of AMT that they paid nearly quadrupled from $66 million to $243 million (see Chart 1). This unexpected growth in the AMT prompted the Franchise Tax Board (FTB) to collect and analyze data from tax returns reporting an AMT for tax year 2000. The results of this analysis are presented below.

Chart 1
Resident, Timely Filed, CA PIT AMT
($ Millions)



The primary finding of this study is that the unexpectedly high levels of AMT in 2000 are attributable to an increase in the value of qualified stock options. In 2001, AMT collections returned to close to their 1998 level. This suggests that the dramatic increase in stock options in 1999 and 2000 was an anomaly. Another interesting finding from this analysis is that almost 20 percent of California AMT filers are minors with unearned income. The amount of AMT paid by minors is relatively small, however. The last section of this paper presents descriptive statistics on the number of Californians whose AMT was large relative to their adjusted gross income. The data suggest that the number of taxpayers facing severe financial hardship from the AMT may be less than has been implied by some accounts of this issue in the popular press.

[1] Burman, Leonard E., William G. Gale, Jeffery Rohaly, and Benjamin H. Harris, “The Individual AMT: Problems and Potential Solutions,” **National Tax Journal**, Vol. LV, No. 3, September 2002, pp. 555 - 596.

The Mechanics of the AMT

The AMT is designed to prevent high-income taxpayers from eliminating all of their tax liability through the use of tax preferences. The AMT calculation starts by calculating a new measure of income, called Alternative Minimum Taxable Income (AMTI). This is done by reversing several of the deductions that were taken in calculating the taxpayer's Taxable Income for regular tax purposes, and adding certain other items, including the value of qualified stock options, that are not included in the calculation of income for regular tax purposes.[2] Tentative Minimum Tax is then calculated by applying a seven percent tax rate to the amount by which the taxpayer's AMTI exceeds their AMT exemption. In 2000, the exemption amount was $60,923 for married taxpayers filing jointly, $45,692 for single filers, $30,461 for heads of household, and $5,200 for taxpayers under age 14 with unearned income. These exemptions are phased out for joint filers with AMTI greater than $228,459, singles greater than $171,345, and heads of household greater than $114,229. The taxpayer's tax liability is equal to the greater of regular tax or TMT. If TMT is greater than regular tax, AMT is equal to the difference between the two.

The Data

Data on the number of AMT payers and the total amounts of AMT paid come from various years of FTB's return processing files, which capture basic data from every California Personal Income Tax (PIT) return filed. Data on detailed components of the AMT calculation come from a special sample created for this study. The AMT sample is a subsample of FTB's 2000 tax year PIT sample. The PIT sample generally contains about 100,000 observations. It includes all taxpayers with Adjusted Gross Income (AGI) greater than $1 million, along with a stratified random sample of all other California PIT returns. For the 2000 PIT sample, a special stratum was created to capture all returns with AMT greater than $100,000. For the AMT sample, the data normally captured for PIT sample purposes was supplemented with all available data from each taxpayer's Schedule P (calculation of AMT). The AMT sample contains 2173 observations for California residents that paid AMT in 2000.[3] To simplify the calculations presented below, nonresidents were excluded from the sample. Their inclusion would not change the results qualitatively because nonresidents paid less than 3 percent of California AMT in 2000.

[2] Most of the items included in the calculation of AMTI increase income, there are some, however, that can decrease income.

[3] The observations were reweighted, by AGI class, from their original PIT Sample weights to achieve total AMT target amounts.

Sources of AMT

We estimate that in 2000 Californians reported $6.2 billion in positive and $0.2 billion in negative adjustments to income for AMT purposes. Table 1 presents a tabulation of the net adjustment amounts reported for those adjustment items on the Schedule P that generate more than $1 million in AMT (see below). The largest single adjustment item is qualified stock options. For regular tax purposes, California does not recognize income when qualified stock options under IRC §422(b) are granted or exercised. Instead, these options are treated like capital gains, and are not taxed until the stock is sold. The value of these options at the time the options are exercised is included, however, in the calculation of AMTI.[4] We estimate that adjustments for stock options were more than $4.6 billion in 2000, or about 78 percent of net total adjustments. After stock options, the largest positive adjustment items were: appreciated contributions, miscellaneous itemized deductions, qualified small business stock, and personal property taxes. 94 percent of the negative adjustments to AMT resulted from special AMT rules on the basis to use for calculating certain types of capital gains and losses. One of these rules is that when a taxpayer sells stock acquired via qualified stock options in a year other than that in which the option was exercised, the taxpayer may, for their AMT calculation, increase their basis in the stock by the amount previously reported as income for AMT purposes.

Table 1 also presents estimates of the number of taxpayers claiming each type of adjustment. The most common adjustment is for personal property taxes. We estimate that 13,661 taxpayers – 60 percent of taxpayers owing AMT – reported this adjustment. Stock options (8,622 taxpayers) were the second most common adjustment. The third most common (7,477 taxpayers) adjustment was for standard deductions. The total amount of these adjustments was so small, however, that they are included in the Other category in Table 1.

Table 1
Number of Taxpayers Claiming and Amounts Reported for Various Items on Schedule P

	Number of Taxpayers	Adjustment Amount ($ Millions)	AMT ($ Millions)
Stock Options	8,622	4,639.9	207.2
Appreciated Contributions	1,205	616.2	14.0
Miscellaneous Itemized Deductions	5,700	308.0	8.6
Personal and Real Property Taxes	13,661	107.2	7.0
Post-1986 Depreciation	1,475	90.1	4.5
Qualified Small Business Stock	278	147.1	4.3
Passive Activities Adjustment	2,098	94.4	3.7
Long-Term Contracts	88	54.3	3.6
Adjusted Gain or Loss	2,308	(160.8)	(12.1)
Other	9,569	62.7	3.1

[4] The amount included in the AMT calculation is the difference between the market price of the stock at the time the option is exercised and the strike price (the amount actually paid for the stock).

The final column of Table 1 presents an estimate of the tax effect of each adjustment item. The effect of individual preference items on AMT is calculated assuming no changes in any of the other preference items.[5] The calculation for each adjustment item is done by removing that item from AMTI for each observation in the AMT sample and recalculating the AMT for each observation. The differences between each observation's AMT with and without the inclusion of the preference item are multiplied by the observation's sample weight, and the results are totaled. This calculation was performed separately for each preference item on the Schedule P. Not surprisingly, the largest adjustment items generate the largest tax effects. We estimate that more than $207 million of the $243 in AMT in 2000 is attributable to stock options. The next most important preference item was appreciated contributions at $14 million, followed by miscellaneous itemized deductions ($9 million) and personal property taxes ($7 million). On the other hand, AMT was reduced by $12 million by adjusted gains and losses.

If stock options were not included in the AMT calculation, we estimate that only 32 of the 8,622 California AMT payers with stock options would still have owed AMT. If taxpayers with stock options are also different in other respects from taxpayers without stock options, the relative importance of the items in Table 1 could be distorted. To test this possibility, the effect of each preference item was recalculated under the assumption that stock options are not included in AMTI. The results of this simulation are presented in Table 2. The list of preference items that generate more than $1 million in AMT does not change when stock options are removed from AMTI. Appreciated contributions remains the top item on the list, although its effect drops from $14 million to $11 million. The effect of miscellaneous itemized deductions remains above $8 million, while the effect of personal property taxes drops from over $7 million to less than $5 million. Most notable is that the reduction in AMT from adjusted gains and losses drops from over $12 million when stock options are included to under $1 million when they are not.

[5] Note that the total of the AMT attributed to each individual item in Table 1 need not equal the total amount of AMT actually collected. Suppose a taxpayer claims two preference items and pays $10 in AMT. The removal of the first preference item may lower the taxpayers TMT below his regular tax, thus saving $10 in AMT. The reinstatement of the first preference item and the removal of the second may have the same result. The total of the two separate reductions in AMT would then be $20 even though the original AMT was only $10.

Table 2 Number of Taxpayers Claiming and Amounts of AMT for Various Items on Schedule P, Taxpayers With Stock Options Excluded		
	Number of Taxpayers	AMT ($ Millions)
Appreciated Contributions	1,043	11.3
Miscellaneous Itemized Deductions	5,509	8.4
Personal and Real Property Taxes	7,870	4.6
Post-1986 Depreciation	1,404	4.5
Passive Activities Adjustment	2,035	3.8
Long-Term Contracts	88	3.6
Qualified Small Business Stock	247	3.3
Other	7,933	1.5

Who Pays the AMT

Table 3A presents data on the distribution of AMT payers and the amount of AMT paid by Adjusted Gross Income (AGI) class. Not surprisingly, most of the AMT was paid by taxpayers with high AGI. Taxpayers with AGI greater than $5 million accounted for less than 1 percent of the number of AMT payers, but more than 18 percent of the amount of AMT paid. Taxpayers with AGI greater than $1 million were less than 7 percent of the AMT population, but paid 44 percent of the AMT. Only 5 percent of AMT was paid by taxpayers with AGI between $0 and $100,000, even though almost half of all AMT payers were in this category.

AMT payers with stock options are more highly concentrated in the highest income brackets than are those without stock options. As shown in the last column of Table 3A, 38 percent of all AMT payers have stock options. 74 percent of AMT payers with AGI over $1 million have stock options, however, compared to less than 20 percent of AMT payers with AGI between 0 and $100,000. To further illustrate this contrast, the income distributions of AMT payers with and without stock options are presented separately in Tables 3B and 3C. 24 percent of AMT payers with stock options, but only 6 percent of AMT payers without stock options, had AGI greater than $500,000. At the other end of the spectrum, 63 percent of AMT payers without stock options had AGI between $0 and $100,000, compared to only 25 percent of AMT payers with stock options. Taxpayers with AGI between $0 and $100,000 paid 16 percent of the amount of AMT paid by taxpayers without stock options, but only 3 percent of the amount paid by taxpayers with stock options. It is also interesting to note that 4 percent of AMT paid by taxpayers without stock options is paid by taxpayers with negative AGI, while the amount paid by taxpayers with stock options and negative AGI is only a fraction of a percent.

Table 3
Income Distribution of Taxpayers Paying AMT

Table 3A
All Taxpayers with AMT

AGI ($)	Percent of Taxpayers	Amount of AMT ($ Millions)	Percent of AMT	Percent of Taxpayers in AGI Bracket with Stock Options
Negative	0.8%	1.7	0.7%	0.5%
0 - 100,000	48.4%	12.0	5.0%	19.6%
100,000 - 500,000	37.7%	82.7	34.0%	51.3%
500,000 - 1 million	6.6%	40.0	16.5%	66.8%
1 million - 5 million	5.6%	61.9	25.5%	74.3%
Over 5 million	0.9%	44.7	18.4%	70.6%
TOTAL	100.0%	243.1	100.0%	38.0%

Table 3B
Taxpayers with Stock Options and AMT

AGI ($)	Percent of Taxpayers	Amount of AMT ($ Millions)	Percent of AMT
Negative	*	0.3	0.1%
0 - 100,000	24.9%	6.4	3.1%
100,000 - 500,000	50.8%	71.0	34.2%
500,000 - 1 million	11.6%	36.1	17.4%
1 million - 5 million	10.9%	56.0	27.0%
Over 5 million	1.7%	37.7	18.2%
TOTAL	100.0%	207.4	100.0%

Table 3C
Taxpayers with AMT but No Stock Options

AGI ($)	Percent of Taxpayers	Amount of AMT ($ Millions)	Percent of AMT
Negative	1.4%	1.4	3.9%
0 - 100,000	62.8%	5.6	15.7%
100,000 - 500,000	29.6%	11.8	32.9%
500,000 - 1 million	3.5%	4.0	11.1%
1 million - 5 million	2.3%	5.9	16.5%
Over 5 million	0.4%	7.1	19.8%
TOTAL	100.0%	35.7	100.0%

* less than .05 %

The Kiddie Tax

One interesting aspect of the analysis above is the large number of AMT payers with very small AGI. Further investigation of tax return data revealed that many of these taxpayers are minors with unearned income. Similar to the regular tax, the AMT has special rules for taxpayers under 14 years old. In particular, their exemption for AMT purposes is only $5,200 plus their amount of earned income. Of course, for regular tax purposes most of these taxpayers' unearned income will be taxed at their parent's marginal tax rate. If the parent's tax rate is greater than the AMT tax rate, the child will not pay AMT. To learn more about these taxpayers, a small number of actual tax returns were examined. For some of the returns in the sample, the child's unearned income was greater than the parent's AGI. In almost all of these cases, the parent was filing under head of household status. In earlier years the parent had filed a joint return. In all of these cases the (presumed) non-custodial parent thus identified had 2000 AGI substantially higher than either the child or the parent claiming the child on their tax return. Thus, it seems likely that a non-custodial parent is the source of the assets whose income puts these children into an AMT position.

The number of observations in the AMT sample was too small to accurately estimate the number of taxpayers in this category.[6] Instead, the number of and amount of AMT paid by taxpayers under age 14 was estimated by searching the FTB's return processing files. The best method for identifying taxpayers under age 14 from the information available on these files is based on the fact that the standard deduction for taxpayers who can be claimed as a dependent on another return was limited in 2000 to the greater of $700 or wages earned. Since very few taxpayers under age 14 have earned income, most, if not all, such children paying AMT will report a standard deduction of exactly $700. Since some older taxpayers may also be claimed as a dependent on another return, this measure will provide only an upper bound on the number of minors paying AMT. For the 2000 tax return process year, there were 3,340 resident taxpayers with both AMT and a deduction of exactly $700. Thus, minors with unearned income may account for as much as 15 percent of all California AMT payers in 2000. The total amount of AMT paid by these taxpayers, however, was less than $1 million, and the average amount of AMT per taxpayer in this group was less than $250. Like the rest of the California AMT, the number of taxpayers with both AMT and deduction levels suggesting that they can be claimed on another return spiked in 1999 and 2000. The number of such taxpayers was about 2,000 in 1998, 2,900 in 1999, and dropped to just under 1,000 in 2001. The average amount of AMT paid per return remained just under $250 in 2001.

[6] Recall that the AMT sample is a stratified random sample. There are relatively few observations in the lower income brackets, but each observation with low AGI has a relatively large sample weight, i.e., is assumed to represent a large number of very similar taxpayers.

The Horror Stories

Since the downturn in the stock market, there have been anecdotal accounts circulating of hardships faced by taxpayers whose AMT liability on their stock options exceeds the current value of the underlying stocks. While the combination of stock losses and AMT liability is undoubtedly unpleasant, many taxpayers in this situation will have sufficient financial resources to pay their AMT.[7] To shed some light on the number of taxpayers who may not have the resources available to cover these AMT liabilities, the ratio of AMT to AGI was calculated for each taxpayer in the sample. We estimate that of the more than 13 million taxpayers in California, 29 owed an AMT on their stock options that was larger than their adjusted gross income, 35 more owed AMT between 50 and 100 percent of their AGI and 283 owed AMT between 20 and 50 percent of their AGI (see Table 4). Even if we consider only taxpayers who owe AMT because of their stock options, the percentage whose AMT is large as a percentage of AGI is relatively small -- only 0.3 percent, 0.4 percent, and 3.3 percent respectively for these three categories. On the other hand, taxpayers owing California AMT are also likely to owe federal AMT. For most of these taxpayers, federal AMT should be about three to four times as large as California AMT. Thus, the number of taxpayers with California AMT greater than 20 percent of AGI may be a reasonable proxy for the number of Californians with combined federal and state AMT greater than AGI.

Table 4
Taxpayers Whose AMT is Large Relative to Their AGI

	Ratio of AMT to AGI		
	>100%	50-100%	20-50%
Number of Taxpayers	28	35	283
Percentage of All Taxpayers With Both AMT and Stock Options	0.3%	0.4%	3.3%
AGI ($)			
0 - 100,000	8	0	0
100,000 - 200,000	14	10	112
200,000 - 500,000	6	20	133
Over 500,000	0	5	38

Of course, many taxpayers whose AMT is large relative to their AGI in one year will have other resources available from which to pay their AMT. Since taxpayers with large incomes are more likely than others to have large amounts of wealth in reserve, Table 4 presents the AGI distribution of taxpayers whose AMT is greater than 20 percent of their AGI. In the group most likely to suffer serious financial hardship from their AMT liability – those with AGI less than $100,000 – we estimate that there are only 8 taxpayers in California. All 8 were in the AMT greater than AGI category. For

[7] It should also be kept in mind that this problem can be avoided by selling enough stock to cover the tax liability as soon as the options are exercised. To cover both federal and state AMT, this would require cashing out about 1/3 of the options.

taxpayers with AGI between $100,000 and 200,000, we estimate that there are 14 whose AMT is greater than their AGI and a total of 136 whose AMT is at least 20 percent of their AGI. The number of actual hardship cases from AMT on stock options will likely be smaller than even these estimates since some of these taxpayers will own stock options that have not lost all of their value and others will have sold some of the stocks before they lost all of their value. If taxpayers were able to sell stocks in 2001 to pay their 2000 AMT, we would expect to see an increase in AGI for these taxpayers in 2001. We do. 40 percent of taxpayers whose AMT was greater than their AGI in 2000 reported AGI greater than $1 million in 2001. An additional 22 percent had a combined AGI for the years 1999-2001 over $1 million. Thus, while the interaction of stock options and AMT undoubtedly produced an unpleasant surprise for taxpayers, it seems that cases of extreme financial hardship caused by this interaction were relatively few.